Cell Biology

IDENTIFICATION OF TUMOR-RELATED CYTOKINES IN A MOUSE MODEL OF CANCER PAIN

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NCTC clone 2472 fibrosarcoma cells were implanted in and around the calcaneus bone of C3H/He male mice. Cytokine production by developed tumors were compared to normal tissue from phosphate-buffered saline injected mice using cytometric bead array (CBA) and immunohistochemistry. CBA data showed increased levels of TNF- , IFN- and MCP-1 in tumor homogenates compared to normal tissue homogenates. Immunohistochemistry staining and the fluorescent DS-red tag of the tumor cells demonstrated co-localization of theses cytokines and tumor cells. The combined information strongly suggests tumor cell production of these cytokines. Osteoclasts were also shown to be labeled within the tumor parenchyma.